

# **MODEL ORDINANCE FOR SITING OF WIND ENERGY SYSTEMS (WES) OVERVIEW**

This model ordinance is intended to be used as a resource by local governments in South Dakota that are in the process of drafting or reviewing their own wind energy system siting ordinances. It was developed by the South Dakota Public Utilities Commission with the help of wind industry representatives as well as stakeholders from local, state and national organizations and agencies. The following is a brief overview of the model ordinance:

The ordinance creates two classes of Wind Energy Systems:

1. Small Wind Energy Systems
  - (a) Tower height less than 75 feet
  - (b) Primarily used for on-site consumption
2. Large Wind Energy Systems – anything not covered by the Small Wind definition

## ***Small Wind Energy Systems***

- All Systems must follow the defined Standards.
  - (a) Setbacks of 1.1 times the system height from surrounding property lines, overhead utility lines, other turbines, roads, and dwellings are defined.
  - (b) Noise limits are set at 55 dBA at the closest neighbor's dwelling.
  - (c) The utility must be notified of the customer's intent to install a generator.
- Building permit requirements are established.
  - (a) Applicant must obtain a building permit before installing the System.
  - (b) The application must include a very detailed plot plan as defined by the ordinance.
  - (c) The permit expires if the system is not installed and functioning within two years.
- The procedure to obtain a building permit is defined.

## ***Large Wind Energy Systems***

- These Systems have the potential to have a major impact on their surroundings so the requirements are much more thorough.
- A list of mitigation measures are defined which include requirements to identify heavy use roads and develop a soil erosion and sediment control plan.
- Setbacks are defined by the following:
  - (a) 1,000 feet from occupied residences, business and public buildings
  - (b) The greater of 500 feet or 1.1 times the system height from the landowner's residence, the right-of-way of public roads, and any property line.
- Requirements are also set for issues such as electromagnetic interference, lighting, turbine spacing, electric cables and feeder lines.
- Minimum height of blade tips is set at 25 feet.
- Minimum noise level at the closest neighbor's dwelling is 55 dBA.
- Requirements for the permit application are defined.
  - (a) The necessary maps are identified.
  - (b) Consultation with S.D. Department of Game, Fish and Parks, U.S. Fish and Wildlife Service, and S.D. State Historical Society is required.
  - (c) The project schedule and mitigation measures are also required.
- A requirement to file preliminary turbine layouts as well as an "as-built" survey is included.
- A subsection on decommissioning requirements is also included.